



U.S. Fish & Wildlife Service

National Fish Passage Program

Reconnecting Aquatic Species to Historical Habitats

ACCOMPLISHMENTS BY STATE **1999-2001**

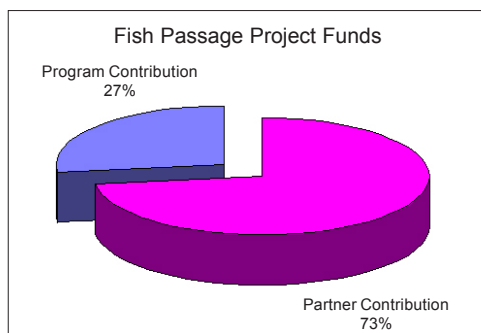
Background

A fundamental fact about fish: they need to move. After more than two centuries of building dams and other barriers on rivers, many Americans are concerned about their effects on fish and other aquatic species. Barriers prevent natural fish migrations, keeping them from important habitats. As a result, some populations of native fish are gone and others are on the brink of disappearing.

The National Fish Passage Program, which began in 1999, is removing and bypassing barriers on a voluntary basis, by working with willing partners from government agencies, private organizations and landowners to restore natural flows and fish migrations.

Accomplishments by State

Restoring fish passage benefits people, fish and other animals. Fish passage projects increase habitat available for fish spawning and growth. Enhanced fish populations provide enhanced opportunities to catch fish. From 1999-2001, the Program has supported 76 fish passage projects, restoring access to over 3,443 miles of river habitat and 65,088 acres of wetlands. This Program has provided \$2.3 million and leveraged an additional \$6.2 million in partner contribution.



Alabama

- 1 project was completed to evaluate fish movements and habitat use at the Claiborne Lock and Dam on the Alabama River.
- This is the first step in designing a fishway for access to over 60 miles of river habitat.
- Federal contribution: \$25,000; Partner contribution: \$8,330.
- Partners included the USACOE, AL Dept. of Conservation and Natural Resources, Geological Survey of AL, and private entities.

Alaska

- 14 projects were completed, including 1 dam removal, 11 culvert renovations, 1 fish ladder, and 2 watershed barrier inventories.
- Access has been provided to over 258 miles and 675 acres of spawning and rearing habitat.
- Federal contribution: \$450,000; Partner contribution: \$3,154,500.
- Partners included the USFWS Partners for Fish and Wildlife and Coastal Programs, BLM, USACOE, NMFS, AK Dept. of Fish and Game, AK Dept. of Natural Resources, AK DOT, City of North Pole, Matanuska - Susitna Borough, Fairbanks North Star Borough, Yukon River Drainage Fisheries Association, Dillingham Middle School, Meadow Lakes School, Trout Unlimited, Williams Petroleum, Alyeska Pipeline Service Company, Fairbanks Soil & Water Cons. Dist., Univ. of AK-Fairbanks, Airway Road Service Dist., Koncor Forest Products, and Sandstrom & Sons, Inc.

Arizona

- 4 projects were completed, including 2 culvert renovations and 2 flow improvement projects.
- Access has been provided to over 24 miles and 25 acres of spawning and rearing habitat.
- Federal contribution: \$52,000; Partner contribution: \$21,000.
- Partners included the USBIA, San Carlos Apache Tribe, White Mountain Apache Tribe, and Ash Creek Cattle Assoc.

California

- 2 projects were implemented, including 1 culvert renovation on Mynot Creek and 1 dam removal with the installation of a fishway and fish screen on the Little Shasta River.
- Access has been provided to over 2 miles of spawning and rearing habitat.
- Federal contribution: \$43,000; Partner contribution: \$15,000.
- Partners included Del Norte County, CA Conservation Corp, and the Yurok Tribe.

Florida

- 3 projects were implemented, including 1 dike removal and 1 flow improvement project on Merritt Island NWR, and 1 study of fish movements and habitat use at the Woodruff Lock and Dam, Apalachicola River.
- Access has been provided to over 73 acres of wetland habitat, and the study evaluation provided information for fish passage alternatives to over 100 miles of large river habitat.
- Federal contribution: \$40,000; Partner contribution: \$45,000.
- Partners included the Volusia County Mosquito Control District, St. John's River Water Management District, the Northwest Florida Aquatic Preserves - Dept. of Environmental Protection, and GA Dept. of Natural Resources.

The goal of the National Fish Passage Program is to restore native fish and other aquatic species to self-sustaining levels by reconnecting habitat that has been fragmented by barriers.



Since 1929, the New Savannah Bluff Lock and Dam on the Savannah River, GA/SC (above) has impeded access to over 20 miles of historical spawning habitat for several fish species. Designs for a fish passage structure at this dam are being evaluated for future construction. USFWS photo.



This dam on the Yellowstone River, MT (above) prevented paddlefish and sturgeon from moving up river. Passage included providing a channel around the dam (below), opening up over 100 miles of historic habitat for spawning and growth. USFWS photos.



Georgia

- In conjunction with Florida and South Carolina, 2 projects were initiated; 1 study of fish movements and habitat use at the Woodruff Lock and Dam, Apalachicola River and 1 fishway design project at the New Savannah Bluff Lock and Dam on the Savannah River.
- The study evaluation provided information for fish passage alternatives to over 100 miles of river habitat and the fishway will provide access to 20 miles of spawning and rearing habitat.
- Federal contribution: \$45,000; Partner contribution: \$475,000.
- Partners included the Northwest Florida Aquatic Preserves - Dept. of Environmental Protection, and GA Dept. of Natural Resources.

Iowa

- 7 culvert renovations were completed; 1 on Mosquito Creek and six on Walnut Creek.
- Access to 85 miles of stream habitat has been provided.
- Federal contribution: \$45,000; Partner contribution: \$75,000.
- Partners included Iowa State University, IA Dept. of Natural Resources, Hungry Canyons Alliance, and NRCS.

Massachusetts

- 1 project to breach the Middlesex Dam on the Concord River is underway.
- Access to 4 miles of stream habitat will be provided when complete.
- Federal contribution: \$25,000; Partner contribution: \$40,000.
- Partners include MA Dept. of Fish and Wildlife, MA Div. of Marine Fisheries, Charles George Landfill Remediation, and NRCS.

Maine

- 2 projects have been completed, including 1 dam removal on East Machias River and 1 fish ladder at Pleasant Lake.
- Access to 296 miles and 768 acres of spawning, rearing and feeding habitat is provided.
- Federal contribution: \$35,000; Partner contribution: \$355,000.
- Partners included the USACOE, NFWF, ME Dept. of Marine Resources, ME Dept. of Inland Fisheries and Wildlife, ME DOT, NRCS, ME Atlantic Salmon Commission, Trout Unlimited, Atlantic Salmon Federation, U.S. Air Force, Town of East Machias, American Rivers, Town of Stetson, and the Downeast Salmon Federation.

Michigan

- 6 projects have been completed; 5 culvert renovations and 1 watershed barrier inventory.
- Access to 32 miles of stream habitat has been provided for fish spawning and growth.
- Federal contribution: \$49,000; Partner contribution: \$36,000.
- Partners included Conservation Resources Alliance, Huron Pine Res. Cons. and Dvlpt. Area Council, Inc., Trout Unlimited, Kalkaska Co. Cons. District, Kalkaska Co. Road Comm., MI Dept. of Natural Resources, MI Dept. of Env. Quality, Upper Manistee River Restoration Committee, NRCS, Maple Island Log Homes of MI, Presque Isle Co. Road Comm., Upper Black River Watershed Restoration Committee, Cheboygan Co. Road Comm., MI Flyfishing Club, Montmorency Co. Cons. Club, Lowshaw Bros., Fish America, NFWF, Otsego Co. Road Comm., Shell Noreast, and Earthworks.

Minnesota

- 3 projects were implemented, including 2 culvert renovations and one dam removal at the Dutton Locks on the Pelican River.
- Access to 15 miles of stream habitat will be provided when complete.
- Federal contribution: \$97,000; Partner contribution: \$80,000.
- Partners included the Grande Portage Indian Reservation, MN DOT, MN Dept. of Natural Resources, City of Detroit Lakes, Becker County, and Pelican River Watershed District.

Montana

- 5 projects have been implemented, including 1 culvert renovation, 3 irrigation diversion improvement projects, and 1 watershed survey.
- Access to 132 miles and 12 acres of spawning and feeding habitat has been provided.
- Federal contribution: \$335,000; Partner contribution: \$165,000.
- Partners included USBOR, MT Dept. of Fish, Wildlife and Parks, Arctic Grayling Recovery Program, USFWS Partners for Fish and Wildlife Program, Crow Indian Nation Fish and Wildlife Department, USBIA, and private entities.



A basket trap has been installed to lift fish over the dike at this Lake Erie Coastal Wetland. This process allows fish access to and from 906 acres of wetland spawning and rearing habitat. USFWS photo.



This dam on Conodoquinet Creek, PA (above) restricted upstream fish movement. By removing the dam (below), 22 miles of additional habitat has been provided for anadromous and resident fish species. USFWS photos.



North Carolina

- 8 projects have been implemented, including 1 culvert renovation, 1 dam removal, 1 fishway design, 1 water control structure improvement project, 2 evaluation studies, 1 watershed survey, and 1 project to develop a restoration plan for the Santee River (SC/NC).
- 1,159 miles and 40,110 acres of habitat have been opened up or assessed for fish passage needs or benefits.
- Federal contribution: \$133,000; Partner contribution: \$322,000.
- Partners included USFWS Coastal Program; NC Div. of Water Resources, USACOE, U.S. Marine Corps, NWF, NC Wildlife Resources Commission, USGS, NC Div. of Marine Fisheries, NC Marine Fish Commission, NC DOT, NC Div. of Emergency Management, NMFS, SC Dept. of Natural Resources, SC Electric and Gas, East Carolina University, and Carolina Power & Light Co.

New Hampshire

- 1 project has been initiated to investigate dam removal or installation of a fish ladder at the Wiswall Dam on the Lamprey River.
- The project will provide access to 45 miles and 300 acres of additional habitat once completed.
- Federal contribution: \$238,000; Partner contribution: \$327,000.
- Partners included NH Dept. of Fish and Game, NPS, Town of Durham, Univ. of NH, USEPA, USACOE, Lamprey River Advisory Committee, NH Dept. of Env. Services, Coastal Conservation Assoc., Hackle and Tackle Club, FishAmerica Foundation, and Trout Unlimited.

Nevada

- 1 project has been initiated to install a fish ladder on the Truckee River.
- The project will provide access to 24 miles of additional river habitat.
- Federal contribution: \$68,000; Partner contribution: \$26,000.
- Partners include USBOR and Pyramid Lake Paiute Tribe.

Ohio

- 1 project was conducted to provide fish passage to diked coastal wetlands in Lake Erie.
- The project provides access to 900 acres of historic spawning habitat.
- Federal contribution: \$80,000; Partner contribution: \$33,000.
- Partners included Ohio State University, OH Dept. of Natural Resources, USGS, Ducks Unlimited, and many local support groups.

Oklahoma

- 2 projects have been completed; 1 culvert renovation on Honobia Creek and 1 low flow road crossing project on the Little River.
- 27 miles of stream habitat have been opened up to fish movement.
- Federal contribution: \$15,000; Partner contribution: \$10,000.
- Partners included OK Dept. of Wildlife Conservation, TX Dept. of Parks and Wildlife, and John Hancock Timer Industries.

Oregon

- 1 large project was conducted, providing fish screens and improvements to irrigation diversions on East Canal and Bridge Creek on Malheur NWR.
- The projects have provided improved access to 65 miles of historic habitat.
- Federal contribution: \$160,000.
- Partners included OR Dept. of Fish and Wildlife.

Puerto Rico

- 1 project is ongoing to design a fishway at the Coloso Dam on the Culebrinas River.
- The project will provide access to 130 miles of historic spawning habitat.
- Federal contribution: \$15,000; Partner contribution: \$50,000.
- Partners include USGS, PR Infrastructure Improvement Agency, PR Aqueducts and Sewers Authority, PR Water Co., and PR Dept. of Natural and Env. Resources.

Pennsylvania

- 2 dam removal projects have been completed; one on Manatawney Creek and the Good Hope dam on Conodoquinet Creek.
- The projects provided access to 37 miles of historic spawning habitat.
- Federal contribution: \$30,000; Partner contribution: \$370,000.
- Partners included Upper Pottstown Watershed Association, USFWS PAFO, PA Dept. of Environmental Protection, USEPA, and America Rivers.



Since 1938, this lock and dam on the Upper Mississippi River, WI has limited paddlefish distribution in the watershed. Current information on the movements of migratory fish is being investigated to facilitate planning for fish passage. USFWS photo.



This irrigation diversion structure on Mill Creek, WY (above) was replaced with natural rock structures (below) to allow fish passage to 15 miles and maintain stream function. USFWS photos.



South Carolina

- 3 projects have been implemented; 1 dam removal study on the Congaree River and 1 fishway design at the New Savannah Bluff Lock, Dam on the Savannah River (with Georgia), and 1 project to develop a restoration plan for the Santee River (SC/NC).
- The dam removal project will open up 25 miles of spawning and rearing habitat and the fishway will provide access to 20 miles of spawning and rearing habitat.
- Federal contribution: \$49,000; Partner contribution: \$551,000.
- Partners included the GA Dept. of Natural Resources.

Tennessee

- 1 project has been implemented to procure and verify an up-to-date database of all dams within the State. The database has been incorporated into the Program's National Inventory of Barriers database and will be used in fish passage analysis and planning.
- Federal contribution: \$5,000.
- Partners included the TN Division of Water Supply.

Virginia

- 2 fishway design projects were implemented; 1 in conjunction with North Carolina on the Roanoke River and one on the Appomattox River.
- 1,120 miles of historic habitat will be opened up when these projects are completed.
- Federal contribution: \$52,000; Partner contribution: \$350,000.
- Partners included the VA Dept. of Game and Inland Fish, USGS, NMFS, USACOE, and City of Petersburg.

Washington

- 3 culvert renovation projects have been implemented; 2 on the Tahuya River and 1 on Skabob Creek, and 1 fishway design project on Icicle Creek is underway.
- Access to 5 miles and 1,113 acres of habitat has been provided and an additional 27 will be opened upon completion of the fishway.
- Federal contribution: \$185,000; Partner contribution: \$157,000.
- Partners included USFS, USEPA, USBOR, Yakama Nation, Reid Realty, Hood Canal Enhancement Group, Volunteer Services, Washington Aquatic Land Enhancement Action, Mason County Dept. of Public Works, WA Dept. of Natural Resources Jobs for the Environment, and a private landowner.

Wisconsin

- 4 projects have been implemented; 2 beaver dam removals, 1 educational workshop, and 1 study of fish movements and habitat use at Lock and Dam #3 on the Upper Mississippi River.
- 5 miles of stream habitat have been restored and information has been obtained to determine fish passage needs on the Upper Mississippi River.
- Federal contribution: \$60,000; Partner contribution: \$51,000.
- Partners included USACOE, NPS, MN Dept. of Natural Resources, WI Dept. of Natural Resources, USGS, Bad River Tribe, and USFWS Coastal Program.

Wyoming

- 3 irrigation diversion improvement projects have been completed; 2 on Mill Creek and 1 on Battle Creek.
- 95 miles and 25 acres of habitat have been restored for fish passage.
- Federal contribution: \$55,000; Partner contribution: \$5,000.
- Partners included NRCS, USBIA, Shosone and Arapahoe Tribes of the Wind River Reservation, WY Game and Fish Dept., and Snake River Conservation District.

For more information, contact:

U.S. Fish and Wildlife Service
Division of Fish and Wildlife Management and Habitat Restoration
Branch of Fish and Wildlife Management Assistance
4401 N. Fairfax Drive, Suite 840
Arlington, Virginia 22203
703/358-1718

<http://fisheries.fws.gov/FWSMA/fishpassage/>

U.S. Fish and Wildlife Service
1 800-344-WILD
<http://www.fws.gov/>